

### **Amendments to the Specification:**

Please amend the two paragraphs of the specification beginning at page 6, line 25, as follows:

K is an electromagnetic constant that is dependent upon the geometries of the first core 18, the second core 22, and the number of coil turns in the conductor 20.  $K = 1/2 N^2 \mu_0 w d$ ; where N = the number of turns of the conductor 20 about the first core 18;  $\mu_0$  = a physical constant of about  $1.26 \times 10^{-6}$  H/m; w = the half width of the center of the ~~First~~ first core 18 in meters; and d = the depth of the center of the ~~First~~ first core 18 in meters. In a preferred embodiment,  $K = 7.73 \times 10^{-6}$  kg m<sup>3</sup>/s<sup>2</sup>A<sup>2</sup>; i = current, measured in amperes; and g = the gap distance, measured in meters.

Current (not shown) directed through the conductor 20 creates an electromagnetic field that attracts the second core 22 towards the ~~First~~ first core 18. The amount of current determines the amount of attraction. Stated another way, when the conductor 20 of the electromagnet 14 is energized, the electromagnet 14 generates a flux that produces an attractive force on the target 16 in accordance with the formula given above, thereby functioning as an actuating portion. Because the electromagnets 14 can only attract the target 16, they must be assembled in pairs that can pull in opposition.